

IN THE CLAIMS:

Please amend claims 4 – 9. Please cancel claims 11 – 59. Please add claims 60 – 70.

1. (original) A printer for transferring images to media using a multi-color dye diffusion process, the printer comprising:

a print station including a printhead and a platen for receiving sheets of receiver media fed therebetween from an input path;

a first discharge path for translating imaged receiver media from the print station to an output tray; and

a second discharge path for translating receiver media from the print station to a compartment separated from the output tray during intermediate passes of the dye diffusion process.

2. (original) The printer of claim 1, the printer further comprising an output diverter which is movable to guide media sheets from the print station to said first discharge path when said output diverter is in a first position, and to guide media sheets from said print station to said compartment when said output diverter is in a second position.

3. (original) A printer for use in transferring an image to a media sheet using a dye diffusion process or a direct thermal process, the printer comprising:

a platen;

a printhead assembly having a printhead and a point of rotation allowing said printhead to be rotated between a first printhead position in which said printhead is proximate a media sheet in contact with said platen and a second printhead position in

which said printhead is separated from said platen; and

a dye diffusion donor apparatus having a donor spool and a take-up spool for dispensing a donor ribbon between the printhead and said media sheet when said printhead is in said first printhead position during dye diffusion printing,

wherein said dye diffusion donor apparatus is movable such that said donor ribbon is not dispensed between said printhead assembly and said media sheet during direct thermal printing.

4. (currently amended) The printer according to claim ~~[[4]]~~ 3, wherein said donor ribbon is placed against said printhead while said printhead is in said second printhead position and said donor ribbon is placed in contact with said media sheet when said printhead is rotated to said first printhead position.

5. (currently amended) The printer according to claim ~~[[4]]~~ 3, wherein said take-up spool rotates about a fixed axis.

6. (currently amended) The printer according to claim ~~[[4]]~~ 3, wherein said donor spool rotates about an axis that that is moveable between a first spool position and a second spool position, said donor ribbon being dispensed between the printhead and said media sheet when said donor spool is in said first spool position.

7. (currently amended) The printer according to claim ~~[[7]]~~ 6, wherein said axis is fixed in said first spool position during said dye diffusion printing.

8. (currently amended) The printer according to claim ~~[[7]]~~ 6, wherein said printhead assembly is between said first spool position and said second spool position when said printhead is in said first printhead position.

9. (currently amended) The printer according to claim ~~[[7]]~~ 6, wherein said take-

up spool is rotated to reduce the length of said donor ribbon between said donor spool and said take-up spool as said donor spool is moved from said first spool position to said second spool position

10. (original) A printer for use in transferring an image to a media sheet using either a dye diffusion process or a direct thermal process, the printer comprising:

a platen;

a printhead assembly having a printhead and a point of rotation allowing said printhead to be rotated between a first printhead position in which said printhead is proximate a media sheet in contact with said platen and a second printhead position in which said printhead is separated from said platen; and

a dye diffusion donor apparatus having a donor spool and a take-up spool for dispensing a donor ribbon between the printhead and said media sheet when said printhead is in said first printhead position during dye diffusion printing,

wherein one of said donor spool and said take-up spool is moveable between a first spool position and a second spool position, said donor ribbon being dispensed between said printhead and said media sheet when said one of said donor spool and said take-up spool is in said first position.

Claims 11 – 59 (cancelled).

60. (new) The printer of claim 3, further including a motor configured to rotate a torque shaft; and

a picker assembly associated with each of a plurality of trays, each of said picker assemblies including:

a drive shaft having an axis, a length, a center, a first end and a second

end;

a compliant belt configured to rotate said drive shaft about said axis in response to rotation of said torque shaft by said motor; and

a pair of picker tires attached to the drive shaft proximate said first and second ends thereof such that the picker tires are coaxial with the drive shaft, the picker tires being rotatable when a torque is applied to said drive shaft by said compliant belt, wherein

a top sheet of the stack of media sheets contained in one of said plurality of trays is dispensed from said tray by moving the picker assembly associated with said one of said plurality of trays to a lowered position in which said pair of picker tires is placed in contact with said top sheet of said stack of media sheets and said pair of picker tires is rotated by rotating said torque shaft.

61. (new) The printer of claim 3, wherein the printhead has a printing surface and a second surface and further including:

a housing including at least one vent formed therein;

a heat sink coupled to the second surface of said printhead for removing heat from said printhead; and

a ventilation channel coupled between the at least one vent and the heat sink to transport air from outside of the housing to the heat sink while preventing said air from reaching said printhead and said platen.

62. (new) The printer of claim 3, further including a motor for providing a single source of torque;

a capstan and pinch roller combination adapted for receiving media sheets and

translating the media sheets past the printhead and the platen in response to a first torque transferred to the capstan from the single source of torque at the motor;

at least one output tray for collecting media sheets translated past the printhead and the platen by the capstan and pinch roller combination; and

a roller adapted for translating media sheets from the capstan and pinch roller combination to the at least one output tray in response to a second torque transferred to the roller from the single source of torque at the motor.

63. (new) The printer of claim 3, further including:

at least one media tray containing a stack of media sheets, said stack including a top sheet, wherein said stack rests on a bottom surface of said media tray;

a picker assembly for applying a lateral force to the top sheet to dispense said top sheet from said media tray;

a light source; and

an optical sensor for detecting when all of said media sheets in said stack have been dispensed from said media tray.

64. (new) The printer of claim 3, further including:

a capstan;

a pinch roller, the combination of said capstan and said pinch roller configured to translate said media sheet through an input path in a forward direction and a reverse direction between intermediate color passes during dye diffusion printing;

a plurality of media trays for dispensing said media sheet from among a plurality of media sheets to the printhead and platen through the input path; and

at least one guide member having a first surface for guiding a leading edge of

said media sheet from one of said plurality of media trays into the input path and a second surface for preventing a trailing edge of said media sheet from entering one of the plurality of media trays when said media sheet is translated in the reverse direction.

65. (new) The printer of claim 3, further including a capstan and pinch roller combination for translating the media sheets through the printhead and the platen to an output path; and

a sensor in the output path positioned to detect one of the first and second side edges of a media sheet while said media sheet is being translated through the output path, said sensor producing output indicating a lateral alignment of the media sheet relative to the printhead.

66. (new) The printer of claim 3, further including a capstan and pinch roller combination for translating said media sheet from the print station through an output path; and

a sensor in the output path at a known distance from the printhead for detecting the leading edge of the media sheets when translated in the output path.

67. (new) The printer of claim 3, wherein the printhead is secured to a printhead support member, said printhead support member having a point of rotation at a radial distance from the printhead; and further including

a torsion arm configured to apply a torque to the printhead support member such that a force is applied to said platen through said printhead when said printhead and said platen are in contact, wherein the torque applied by the torsion arm is controllable by a printer controller to maintain the force applied to the platen at a first force which is suitable for printing using a dye diffusion technique or a second force which is suitable

for printing using a direct thermal transfer technique.

68. (new) The printer of claim 3, wherein the printhead has a linear array of thermal elements, each of the thermal elements having an imaging surface for applying a force to the platen at the imaging surface and having a heat sink thermally coupled to the array of thermal elements, and further including

a vent channel being fixedly attached to the external vent and being coupled between the heat sink and the external vent to permit air to circulate from external of the enclosure to the heat sink; and

a flexible coupling between the vent channel and the heat sink permitting movement of the printhead such that the force applied to the platen during printing is substantially uniform over the array of thermal elements.

69. (new) The printer of claim 3, further including a print controller;

a plurality of media trays, each of the media trays holding a stack of media sheets of a uniform media type, at least two of the media trays having a plurality of media sheets of distinct media types;

a marking associated with each of said media trays, said marking containing readable information indicating one of the size, the type, the opacity, the thermal characteristics and the lot number of said stack of media sheets associated with said media tray; and

an optical sensor for reading said marking and transmitting data related to said readable information to said processor.

70. (new) The printer of claim 3, further including a print engine for transferring images to media in response to control signals;

a printer controller for providing the control signals to the print engine based upon image data;

a first non-volatile memory storing printer system data accessible by processes executing at the printer controller, the printer system data including data representative of Postscript keys, gamma correction settings and a network address associated with the printer; and

a second non-volatile memory for storing a copy of the printer system data, the second non-volatile memory being detachably coupled to the printer and capable of being coupled to a second printer for downloading the printer system data to the second printer.